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STATE OF MICHIGAN
IN THE COUNTY OF JACKSON

PUBLIC COMMENT ON PROPOSED
CLASS II PERMIT
UNDERGROUND INJECTION WELL
WEST BAY EXPLORATION COMPANY

PUBLIC HEARING
May 23, 2012 - 7:00 p.m.
Brooklyn, Michigan
Dana Rzeznik, EPA Hearing Officer

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APPEARANCES

Dana Rzeznik, EPA Hearing Officer
Anna Miller, EPA Scientist
Jeffrey Wawczak, EPA Scientist
Timothy Elkins, EPA Scientist
Jennifer Ostermeier, EPA Hearing Facilitator
Peter Cassell, EPA Public Affairs

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Mindy Womack, Court Reporter

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1 MS. RZEZNIK: Will the hearing come to order
2 please. Good evening. Welcome! I am Dana Rzeznik,
3 I'm an Environmental Engineer with the United States
4 Environmental Protection Agency, and tonight I am the
5 Hearing Officer, representing EPA for this public
6 hearing. With me are: Anna Miller, an environmental
7 scientist with EPA and author of the draft underground
8 injection control permit; Jeffrey Wawczak, an EPA
9 environmental scientist; Timothy Elkins, also an EPA
10 environmental scientist, Jennifer Ostermeier, EPA
11 hearing facilitator and Peter Cassell from the EPA
12 office of Public Affairs. We are here to listen to
13 your comments regarding a permit EPA has proposed to
14 issue to West Bay Exploration Company for a Class II
15 injection well located in Jackson County, Michigan.

16 The permit which is the subject of tonight's
17 hearing is being issued pursuant to the Federal
18 Underground Injection Control Program for the State of
19 Michigan, which may be found in the Code of Federal
20 Regulations at Title 40, Section 147.1151. This
21 section was promulgated pursuant to Part C of the Safe
22 Drinking Water Act. It incorporates the Underground
23 injection Control Program requirements of Part 124, 144
24 and 146 of the Code of Federal Regulations. The
25 effective date of this program in Michigan was June 25,

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1 1984.

2 The Underground Injection Control of UIC
3 Program is designed to protect underground sources of
4 drinking water by permitting only those injection wells
5 which meet stringent technical requirements. The
6 program is also designed to ensure public participation
7 in the permitting process. The public is invited to
8 comment on every proposed permit decision. EPA holds
9 public hearings for those draft permit decisions that
10 generate significant public interest or comments.

11 The proposed permit which is the subject of
12 tonight's hearing is a Class II injection well. Anna
13 Miller will describe the well and the safeguards
14 provided to protect the environment. An announcement
15 of this public hearing was made in the Jackson
16 Citizen-Patriot, April 17, 2012 and was mailed to those
17 who provided comments.

18 Now, a little bit about the nature of a
19 public hearing. Public hearings provide members of the
20 public with an opportunity to publicly make EPA aware
21 of their views on an intended regulatory action.
22 Although oral presentations are recorded word for word
23 by a court reporter, there is no sworn testimony or
24 cross-examination. This is your opportunity to tell us
25 officially whether you feel the terms of the permit are

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1 consistent with EPA's Underground Injection Control
2 Program requirements and whether the facts, as EPA has
3 determined them, are accurate. During the comments
4 portion of this hearing we will listen to them only.
5 We will not respond to these comments this evening.
6 All comments received will be reviewed and addressed in
7 a responsiveness summary to be added to the permit
8 Administrative Record.

9 EPA will consider all comments in making its
10 decision to issue or deny this UIC permit for West Bay
11 Exploration Company. You may appeal any technical
12 details or qualifications of the final permit decision
13 only if you submit written comments on the draft permit
14 during the public comment period or if you make a
15 statement in this hearing tonight. If you wish to make
16 a statement at this hearing, please be sure that you
17 have filled in a registration form so that we may
18 correctly enter your name into the hearing record.
19 Even if you don't choose to make a statement, but want
20 to receive a copy of any response and the final permit
21 decision, make sure that you have indicated so on the
22 sign-in sheet at the sign-in table.

23 Copies of the transcript of this hearing as
24 well as all written comments submitted in this
25 proceeding will be maintained at the EPA, Region 5

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1 offices in Chicago and will become part of the
2 Administrative Record. The transcript of this meeting
3 and a copy of the responsiveness summary of comments
4 received, will also be available for your review at the
5 Jackson District Library 244 W. Michigan Jackson,
6 Michigan. These documents will also be available on
7 EPA website at
8 <http://www.epa.gov/region5/water/uic/uicpub.htm>.

9 The public comment period has been extended
10 through June 1 so that if you have written statements
11 upon the conclusion of the hearing, you may also
12 forward those to EPA, at the address in the Public
13 Notice which has been provided.

14 First Ms. Miller will read her statement into
15 the record. Ms. Ostermeier will then begin calling on
16 those who have checked on their registration form that
17 they would like to make a statement and have it
18 transcribed by the court reporter. Now, I will turn
19 the floor over to Ms. Anna Miller.

20 MS. MILLER: Good evening. My name is Anna
21 Miller. I am an environmental scientist with the
22 United States Environmental Protection Agency in
23 Chicago, Illinois.

24 I am the permit writer of the draft permit
25 for the West Bay #22 proposed well. I am here today to

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1 listen to comments on a permit to inject fluid
2 underground through a well for waste disposal purposes.

3 EPA proposes to issue a permit to West Bay
4 Exploration Company under the Federal Underground
5 Injection Control Program for the State of Michigan.

6 The Federal Underground Injection Control
7 Program is a part of the Federal Safe Drinking Water
8 Act. Regulations for the Safe Drinking Water Act
9 impose technical requirements on injection wells to
10 protect underground sources of drinking water.

11 The scope of the Federal Underground
12 Injection Control Program is to determine the soundness
13 of construction and operation of injection wells as
14 they relate to protection of all underground sources of
15 drinking water. An underground source of drinking
16 water is defined in the Safe Drinking Water Act as a
17 aquifer or its portion which contains less than 10,000
18 milligrams per liter of total dissolved solids. This
19 includes current sources of drinking water, as well as
20 potential sources of drinking water.

21 The permit which is the subject of today's
22 hearing is a Class II disposal injection well permit
23 for the proposed West Bay #22 well. The proposed
24 injection well would be used to inject fluids that
25 result from the production of oil and gas into the

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1 ground for disposal. These fluids are commonly called
2 brine. The well would inject fluids from the West Bay
3 Exploration Company's production wells. The total
4 depth of the well would be 2,950 feet.

5 EPA reviewed the geology of the area, the
6 construction records of nearby existing deep wells, and
7 the proposed well construction and well operation data.

8 The base of the lowermost possible
9 underground source of drinking water in the vicinity of
10 the injection well has been identified as the Marshall
11 Sandstone located about 226 feet below ground surface.

12 The injection zone is limited by the permit
13 to the Niagara Group in the interval between 2662 and
14 3032 feet below ground surface.

15 The Niagara Group injection zone is separated
16 for the lowermost underground source of drinking water
17 by a confining layer and approximately 2436 feet of
18 shales, limestones and various other rock formations.

19 The confining zone will serve to prevent the
20 injection fluid from migrating upward out of the
21 injection zone.

22 The well will be constructed to prevent the
23 movement of fluid into or between the deepest
24 underground sources of drinking water. It will be
25 fully encased and cemented to the surface. Injection

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1 will take place through tubing, which is set within the
2 steel casing. A packer will be set at the bottom of
3 the tubing to seal off the space between the casing and
4 tubing, which will be filled with a liquid mixture
5 containing a corrosion inhibitor, and will allow the
6 pressure in the space to be monitored.

7 The injection pressure will be limited to 682
8 pounds per inch gauge. This limitation will ensure
9 that the injection pressure will not cause injection
10 formation -- injection or formation fluid to move into
11 underground sources of drinking water. The permit
12 would also limit the injected fluid to brine.

13 The West Bay Exploration Company may not
14 start drilling or constructing the injection well until
15 a final permit has been issued. Before EPA authorizes
16 the company to inject, West Bay Exploration Company
17 must conduct and pass a mechanical integrity test; that
18 is, the pressure in the space between the tubing and
19 the casing is monitored and tested before operation to
20 make sure there are no leaks.

21 If West Bay Exploration Company is issued the
22 permit, they will be responsible for observing and
23 recording: Injection pressure, flow rate, annulus
24 pressure, and cumulative injected volume on a weekly
25 basis and will report this information to EPA on a

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1 monthly basis.

2 West Bay Exploration Company will also be
3 responsible for observing, recording and reporting
4 annulus liquid loss on a quarterly basis. They must
5 also submit an analysis of injected fluid on an annual
6 basis.

7 They must test for mechanical integrity every
8 five years thereafter as long as the well is operating.
9 The tests are witnessed by EPA representative.

10 West Bay Exploration Company has demonstrated
11 adequate financial responsibilities to close, plug, and
12 abandon this injection well. A state bond in the
13 amount \$25,000 has been established for this purpose.

14 Now it is your opportunity to tell us your
15 comments on the proposed permit.

16 EPA will consider all comments in making its
17 decision to issue or deny this underground injection
18 control permit to West Bay Exploration Company.

19 Jennifer?

20 MS. OSTERMEIER: I have a list of the folks
21 who are interested in making a formal public comment
22 this evening. What I would like for folks to do is I'm
23 going to call two names at one time. The first name
24 I'd like to go to this microphone, and the second, just
25 come here and sit so that we can make this as quick as

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1 possible and we can make sure to get everybody's
2 comments this evening.

3 We are going to -- we have about 30 to 35
4 commenters this evening, so I'm going to try to limit
5 those public comments to four minutes, which should get
6 us out of here approximately 9:00. So that's the first
7 thing.

8 The second thing is, when you do come up to
9 make your public comments, please state your name and
10 spell your name for the court reporter so that we can
11 make sure that your comment is attributed to you.

12 That being said, these names are in no
13 particular order so if the first person would come up.
14 Victoria Powell, please come to this microphone, and
15 then that would be followed by Pamela Johnson.
16 Victoria? Pamela? Okay.

17 MR. POWELL: Victoria Powell,
18 V-I-C-T-O-R-I-A, P-O-W-E-L-L. I'm a resident of
19 Lenawee County. I'm a pediatrician. I listened to the
20 comments and questions in the first half of the
21 meeting, and I'm struck by the fact that I witnessed
22 that a member from the DEQ was laughing during part of
23 this. The second person was sleeping during part of
24 our very important comment session. That disturbs me,
25 and it disturbs me because the DEQ is the department in

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1 our state that allows permits for gas and oil drilling
2 in our state. And Hal Fitch didn't come but he is
3 notorious for saying that as a single deciding person,
4 he allows these permits to take place after an
5 environmental impact assessment is done. The industry
6 does the assessment. I really don't know if he's ever
7 denied permits, to be honest with you.

8 But what disturbs me further is that the
9 questions that have come up tonight, we seem to know
10 more the answers and the information than the
11 responders. How can that be? I mean we rely on people
12 who are educated and knowledgeable and are supposed to
13 be informed, and we only are here to help them help us.

14 Injection wells are serious business, and
15 it's my particular concern that we did not discuss the
16 risks that are involved with injection wells. There is
17 approximately 13% leakage or contamination of water
18 from injection wells that have already been placed in
19 the state. Many of you know Dr. Grobbel who appeared
20 about a month ago, gave us very important information
21 about the seriousness of injection wells.

22 And we did not address really the upward
23 migration of contaminated toxic brine solution that is
24 going to be going into the injection wells. Nobody
25 seems to know how far it will spread. Nobody knows how

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1 it's going to really be alerting the public if there is
2 a contamination. And I just want to know why don't
3 they know this stuff? Why don't we know it? Why can't
4 we know it. I feel that we're getting railroaded and
5 forced to accept more and more what the oil and gas
6 industry is in charge of. They gain everything, and we
7 gain very little.

8 I think that everyone is aware of what
9 happened to Kalamazoo River, and that would have been
10 January 25th, 2010. To date it has not been cleared,
11 and this is a perfect example of how measuring pressure
12 and the system fails. It took 20 hours with altered
13 pressure readings in the ruptured pipe before anyone
14 came and shut the oil flow off. And to this very day,
15 we still have horrible contamination of one of the
16 major rivers in our state.

17 I think that if nothing else comes out of
18 this, I would ask members of the EPA to please find out
19 some of the answers that we were looking for that we
20 did not receive tonight, and to be as concerned as we
21 are. Thank you.

22 MS. OSTERMEIER: Pamela Johnson. Next would
23 be Judy Botte.

24 MS. JOHNSON: My name is Pamela Johnson,
25 P-A-M-E-L-A, J-O-H-N-S-O-N. I'm Norvell Township

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1 trustee. My question -- my comment is why does EPA
2 grant permits for practices that could be so
3 potentially damaging to our environment based on
4 information provided by the permit applicant without
5 doing their own environmental impact study? It is
6 scary that everything that we do is very close to
7 water. If anything contaminates our water sources, our
8 entire area will be tremendously damaged. This needs
9 to be considered. Thank you.

10 MS. OSTERMEIER: Thank you. Tim Porter will
11 be after Judy.

12 MS. BOTTE: My name is Judy Botte, B-O-T-T-E.
13 My question is what it was a while ago. If you don't
14 know how far the contaminants are going to be
15 spreading, why would you authorize a permit that is
16 close to the Raisin River? That doesn't make sense to
17 me at all. Thank you.

18 MS. OSTERMEIER: Thank you. Tim Porter.
19 After Tim the next person is Peter Bormuth.

20 MS. PORTER: I'd just like to say that at the
21 end of the day, my family and I both will be within a
22 mile radius of the seawall injector. You don't seem to
23 even know for sure definite answers, but you're
24 qualified to approve it. I can't accept that.

25 MS. OSTERMEIER: Peter Bormuth is next.

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1 After him, Pam Anderson.

2 MR. BORMUTH: Hi. I have a number of
3 comments. The first is a factual inaccuracy on the
4 application by West Bay. They state that Donald and
5 Elaine Orvos are the owners of a property at 12536 Ladd
6 Road, and real estate summary sheets say the owners are
7 Lawrence and Wanda Holcomb at 12536 Ladd Road. Now
8 this may just be a clerical error. On the other hand,
9 it's possible that Mr. Lawrence Holcomb is opposed to
10 this well and has been deliberately denied from being
11 placed on this sheet, appendix 1P22 submitted by West
12 Bay Oil Exploration to the EPA.

13 I have a second comment that I would like to
14 make the EPA themselves on the fact sheet for this well
15 admits that, "common constituents found brines may --
16 oil field brines may contain various amounts of
17 hydrocarbons such as benzene, ethylbenzene, Toluene,
18 Xylene, Naphthalene, and polycyclic aromatic
19 hydrocarbons.

20 I'd like the people here to know what the
21 toxicity of these substances is. This is from the
22 medical dictionary. Benzene is conclusively known as a
23 human carcinogen and a notorious cause of bone marrow
24 failure. Vast quantities of epidemiological clinical
25 and laboratory data linked Benzene to aplastic anemia,

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1 acute leukemia, kidney cancer and bone marrow
2 abnormalities. It's also been linked to neuro birth
3 defects and spina bifida.

4 Ethylbenzene exposure can irritate the eyes,
5 nose and throat. Very high levels can cause paralysis,
6 trouble breathing and death. High exposure may also
7 damage the liver and chronic long-term effects can last
8 for months or years.

9 Toluene, I may BE pronouncing that wrong, I'm
10 sorry. Exposure is associated with effects such as:
11 Psychoorganic syndrome; visual evoked potential, toxic
12 polyneuropathy, optic atrophy, brain lesions,
13 cerebellar, cognitive, and pyramidal dysfunctions. Low
14 to moderate levels can cause tiredness, confusion,
15 weakness, drunken-type actions, memory loss, nausea and
16 loss of appetite, hearing and color vision.

17 Xylene is an irritant of the eyes and mucus
18 membranes IN concentrations below 200 ppm. Ingestion
19 of xylene causes gastrointestinal distress, disturbance
20 of liver and kidney function, and may cause toxic
21 hepatitis. Chronic exposure can cause central nervous
22 system depression, anemia, mucosal hemorrhage, bone
23 marrow hyperplasia, liver enlargement, and liver
24 necrosis.

25 Naphthalene is classified as possibly

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1 carcinogenic to humans and may damage or destroy red
2 blood cells. Exposure may cause confusion, nausea,
3 vomiting, diarrhea, cataracts, blood in urine and
4 jaundice. Under California's Proposition 65,
5 Naphthalene is listed as known to the state to cause
6 cancer.

7 Polycyclic aromatic hydrocarbons are known
8 for their carcinogenic, mutagenic and teratogenic
9 properties. Prenatal exposure is associated with lower
10 IQ and childhood asthma. The Center for the Children's
11 Environmental Health reports that exposure to PAH
12 during pregnancy is related to adverse birth outcomes
13 including low birth weight, premature delivery, and
14 heart malformations. These are not benign chemicals.

15 Plaintiffs would also like -- I'd also like
16 to point out that these wells have caused aquifer and
17 well contamination in other states. The Texas Railroad
18 Commission, which oversees oil exploration and waste
19 injection wells in Texas, has received thousands of
20 complaints over the years from individual landowners.
21 Complaints that come from 85 different counties, almost
22 all alleging groundwater contamination by sodium and
23 waste hydrocarbons.

24 Officials in Chico, Texas wrote letters to
25 the Railroad Commission asking for stronger regulations

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1 and increased monitoring to protect their water wells.
2 They were ignored. And in 2005 fluids from the Class
3 II well came bubbling to the surface and other nearby
4 water wells outside the quarter mile radius around the
5 injection well.

6 Plaintiffs would like to point out that Anna
7 Miller said that the bond of this well is \$25,000.
8 It's bond number 08937735 Fidelity Deposit Company of
9 Maryland. This bond is completely insufficient even
10 dealing with the problems around a quarter mile acre
11 radius if you surround this well. The properties, the
12 SEV value of those properties from Jackson County is
13 \$1,451,920. Should a surface water contamination issue
14 arise, it's reasonable to expect the contamination to
15 effect Vineyard Lake and the Raisin River. I'd like to
16 note that lakefront properties alone, not including
17 subdivision behind it 342 parcels on Vineyard Lake, are
18 worth SEV 25 million dollars.

19 I'd also like to point out that the Ohio
20 Department of Natural Resources recently closed one of
21 these wells in the Youngstown area because it had
22 caused 12 different low magnitude earthquakes. The
23 report from the Ohio DNR concludes that a fault must
24 already exist in a crystalline basement rock. The
25 fault must be in near-failure state of stress; that an

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1 injection well must be drilled deep enough and near
2 enough to the fault and have a path of communication to
3 the fault; and that the well must inject a sufficient
4 quantity of fluid at a high enough pressure for an
5 adequate period of time to cause failure.

6 The Ohio DNR report concluded that the
7 Northstar Class II injection well caused the
8 earthquakes in the Youngstown area, and they decided
9 that they would require a number of reforms in the
10 permitting process, including a complete suite of
11 geophysical logs, including, at a minimum, gamma ray,
12 compensated density, neutron, and resistivity logs.
13 I'd like those to also be conducted here in the state.

14 I'd also like the EPA to take notice of the
15 Indiana bat is in this area, and that they must be
16 respected because they're on the Federal Endangered
17 List.

18 And finally, I want to talk about the geology
19 of this site, which is the most important factor. West
20 Bay's application states that the upper confining zone
21 evaporite at depths of 2634 feet to 2066 feet. The
22 description of this is Anhydrite, dense, hard, white,
23 an excellent barrier to flow. Geologists rate mineral
24 hardness according to Moh's hardness scale, which shows
25 Anhydrite to be a 3.5 on a scale of 10. The truth is

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1 that Anhydrite is relatively soft, weak and easily
2 formed. It's also a geological fact, Miss Miller, that
3 Anhydrite upon exposure to water turns into gypsum,
4 which is the second softest material on the Moh's scale
5 and is basically porous and solvent in water, and
6 salinity adds to this effect. It lowers the
7 temperature at which the transition must take place.

8 I would like to suggest that EPA is guilty of
9 gross negligence for permitting this well. Anhydrite
10 will not cap it. Within 30 years, all of that fluid
11 will come bubbling to the surface, and I've already
12 told you what those chemicals will do to you, and your
13 children, and your grandchildren. Thank you.

14 My name is Peter Bormuth, and it's spelled
15 B-O-R-M-U-T-H, just so you don't remove my comments
16 from the record.

17 MS. ANDERSON: Okay. That's really hard to
18 follow.

19 My name is Pam Anderson, P-A-M,
20 A-N-D-E-R-S-O-N. And my comments are I am very, very
21 appalled with the EPA. First of all, I'm very appalled
22 that you do not even bother to make the chemical
23 composition of the brine made public. And every time
24 West Bay was asked, it's their secret ingredients. I'm
25 very disappointed that that has never been brought out

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1 to the surface.

2 Also, how simple would it be to require them
3 to have a monitoring well, because you don't even know
4 how far down it's going to spread, don't know how wide
5 it's going to spread? A monitoring well would help
6 relieve a lot of people's minds knowing that it is not
7 coming to the surface, knowing that it is not spreading
8 either direction where it's not supposed to be. Thank
9 you.

10 MS. OSTERMEIER: Holly Taylor followed by
11 Pamela Bacon.

12 MS. TAYLOR: My name is Holly Taylor,
13 H-O-L-L-Y, T-A-Y-L-O-R. I would like to request that
14 in the event that this Class II injection well is
15 reclassified, which I understand happens sometimes,
16 that some forum, public forum, some forum be devised
17 for a public forum, a hearing on that reclassification
18 before it's allowed to go through. The EPA is the only
19 one who can do this, and you need to come up with a
20 mechanism and assure us that that mechanism is going to
21 work. Thank you.

22 MS. OSTERMEIER: Pamela Bacon, followed Adam
23 G. Ulbin.

24 MS. BACON: My name is Pamela Bacon,
25 P-A-M-E-L-A, B-A-C-O-N. May 2010 St. Joseph Church we

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1 had a first town hall forum. Walter from the DEQ
2 visited. He told us specifically that we would not
3 have any radioactive or hazardous waste from any of the
4 drilling that was taking place in our area; that it
5 would be definitely transported to an EPA approved
6 site, not in the Irish Hills. My question is, what
7 prompted this change that we are now having to be faced
8 with two of them, one on Palmer Road, one on the Ladd/
9 Bettis area?

10 Number two, I'd like to understand too if we
11 are now the top producer, the Irish Hills, top producer
12 of oil and gas -- let me change that. We are of oil.
13 Top is the one producer in Michigan. We have right now
14 42, 45 wells in production. We are slated for another
15 40, what I've heard. We had two injection wells. I
16 was told that out of that 45 wells, two injection wells
17 were needed to put the waste. That means that we have
18 another 40-some odd wells coming in. That means we are
19 now obviously going to be faced with more injection
20 wells.

21 I would hope that we would be told this way
22 before we were -- the's fees that we're now being laid
23 with on Palmer and on Ladd. Again, we were not even
24 aware of that in this community. It was by pure luck
25 that this information came out so that our community

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1 could talk about this tonight. So that's it. Thank
2 you.

3 MS. OSTERMEIER: Adam Ulbin, and he will be
4 followed by Art Botte.

5 MS. ALDEN: Adam Ulbin, supervisor Norvell
6 Township spelled U-L-B-I-N.

7 Michigan has four of the largest rivers that
8 pass through Jackson County. We have Grand River
9 river, the Kalamazoo River, Portage River and the River
10 Raisin which runs through Norvell Township. In fact,
11 in Norvell Township we have River Raisin running
12 through two parts of the township, one in the northern
13 portion, one through the Village of Norvell, and the
14 other outlet is through Mud Lake.

15 Norvell Township has many, many lakes in it,
16 has many tributaries, has many wetlands. We have
17 Vinyard Lake we have Wamplers Lake, we have Mud Lake,
18 Swezzey Lake, Norvell Lake. There's several lakes,
19 several unnamed lakes in our communities.

20 We have taken a lot of time and a lot of
21 pride on our zoning ordinance and looking at
22 environmental impacts that could happen to our lakes,
23 and we've implemented a lot of things that would
24 prevent people such as not oil people, we do cover
25 that, unfortunately, I don't know if we could have, but

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1 there's a lot of protection in our zoning ordinances.

2 One of the things we have done in our
3 township is the two major lakes that we have is
4 Wamplers Lake and Vinyard Lake. People have taken --
5 spent a lot of money, put sewers around the lake to
6 protect the groundwater, to protect their drinking
7 water, and now we're confronted with this particular
8 type of injection well.

9 As I said before, we were never notified that
10 this injection well is going in, so we started looking
11 into it and Hal Fitch, kind of a repeat, but I think
12 it's important it goes for the record Hal Fitch of the
13 DEQ, we had the opportunity the tell people at Super 8
14 Motel that they had already approved these two
15 injection wells, one on Bettis Road and one within 1000
16 feet of the River Raisin that was done some 13 months
17 ago.

18 I guess what I would ask based on a lot of
19 this testimony that's given here, I would request that
20 the EPA change -- make a change in its draft permit,
21 this particular permit, take in consideration all this
22 testimony that's been given. This is an
23 environmentally sensitive area in our township.

24 I think of Norvell Township as being one huge
25 wetland in the Irish Hills area. There isn't hardly a

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1 spot you can go where you're either up on a hill or if
2 you're down low. For many people that's
3 environmentally sensitive. So I request a change in
4 the draft. Thank you.

5 MS. OSTERMEIER: Thank you. Again, next is
6 Art Botte, and followed by Art will be Jack Curtis.

7 MR. BOTTE: Yes. My name is Art Botte,
8 B-O-T-T-E. I just want to go on record as saying that
9 I'm opposed to putting in injection wells in Norvell
10 Township or Jackson County or Lenawee County. I
11 totally believe they are environmentally unsafe. I'm
12 sorry I can't believe the propaganda you've been
13 telling us for the last two hours.

14 MS. OSTERMEIER: Dan Curtis. Followed by
15 Dennis Conant. Mr. Curtis. We'll come back to him in
16 case he stepped out. Dennis Collins, followed by
17 Michael Horning.

18 MR. CONANT: Dennis Conant, last name
19 C-O-N-A-N-T, Norvell Township attorney. I'd asked a
20 question earlier in the evening as to whether or not
21 DEQ is aware of any failures in their injection wells
22 that happened apart from failure of the casing. That
23 answer was not -- that question was not answered. They
24 said well make sure you make it part of this hearing,
25 and so I'm making that a request of this hearing. You

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1 advised whether or not there's been any failures not
2 related to the casing.

3 My concern, of course, is that they talk
4 about the level of containment. Every time you put a
5 hole down you are, in fact, going through the levels,
6 you are creating a pathway for migration of fluid that
7 you're trying to put down there.

8 With oil wells and gas wells you have to
9 drill where you find the resource, and Michigan creates
10 a presumption that people are entitled to do that.
11 We're not against oil and gas wells in Norvell
12 Township. Injection wells, however, can be located
13 anywhere because it's not a natural resource that you
14 are collecting from the earth, it's something that's
15 really a waste disposal site. So you can locate that
16 waste disposal site anywhere.

17 West Bay has written us and they have told us
18 that they were environmentally sensitive to the
19 location of these injection wells. Well they're a
20 thousand feet from the Rasin River. I suspect if it
21 would have saved them some money, they probably would
22 have had a platform out in the middle Norvell Lake and
23 used that for an injection site. They're not
24 environmentally sensitive. That's our concern is that
25 if we get contamination, we get leakage, we get a

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1 failure of the casing, we get upward migration through
2 whatever means because when you put a hole through
3 rock, it doesn't mean you're going to have a site seal.
4 You might very well have fracturing that's going to
5 allow migration right along the very pipe that's
6 designed to put this stuff down there. How does that
7 happen? It happens because of the pressure which
8 causes the upward migration. It's got to go up a ways,
9 no question about that, but when it gets into the
10 aquifer, it's going to go, and then the approval of
11 this permit could cause contamination of the Great
12 Lakes. The river Raisin goes right to Lake Erie. Goes
13 to a number of communities before it gets to Lake Erie
14 and then.

15 MS. OSTERMEIER: I was just saying you're
16 right at four minutes.

17 MR. CONANT: Okay. I'll try to finish up.
18 It goes on Lake Ontario or goes towards the Detroit
19 River and on to Lake Huron.

20 Right now they're authorized at 1200 barrels
21 a day. That could change. That's the permit
22 requirement right now of brine and whatever else is
23 contained. They're saying that well, we're just
24 putting back down in the earth what came out of it.
25 Well they are, but they're concentrating it in one

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1 spot. These are coming from a number of wells around
2 the area. They say well they'll all be in this general
3 area. I'm saying that I'm not convinced that we're
4 being protected. We were not notified by the State of
5 Michigan at the DEQ hearing. They don't tell you what
6 the state requirements. They notified the county
7 clerk. Well who thought to contact the county clerk to
8 see if there was any request for permit? We will from
9 now on, I can tell you that much.

10 So here we are, and now we've got the federal
11 DEQ and they told us that well this is the draft
12 permit, we're going to just go ahead and we have to
13 hold a public hearing, but we're going to approve this.
14 That's basically what I heard when I talked with Ms.
15 Miller the other day.

16 So I'm concerned that this is going to go in
17 without any safeguard to the community, and if, in
18 fact, we have contamination, we'll be hundreds of years
19 cleaning it up. I'll be dead and gone and West Bay
20 will say, you know what, we followed all the permit
21 requirements with the State of Michigan and the Federal
22 DEQ. Thank you.

23 MS. OSTERMEIER: Thank you. Michael Horning
24 followed by Fred Marsh.

25 MR. HORNING: My name is Michael Horning,

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1 H-O-R-N-I-N-G. I'll repeat, I-N-G.

2 I came here basically tonight to try and find
3 out some answers to questions that I had thinking the
4 professionals were going to be here and, unfortunately,
5 I really haven't heard, except for a depth chart, of
6 very many explanations of an injection well. I seem to
7 be getting most of my information from people that are
8 just average citizens like the rest of us that looked
9 into this even more than I have, and I have some real
10 sympathy for these people, and some of the questions
11 that they're bringing up.

12 I would like to go on record as saying that
13 at this point coming into the meeting I was not one way
14 or the other on injection wells. I just came for
15 information. But after the meeting tonight, I would
16 like to say that I am definitely against an injection
17 well in Norvell Township. Thank you.

18 MS. OSTERMEIER: Next is Fred Marsh followed
19 by George Sanfacon.

20 MR. MARSH: Fred Marsh, M-A-R-S-H.

21 EPA environmental potential accident, that's
22 what I see. I'd like to thank all my neighbors and
23 friends for coming down here and expressing their views
24 on what's going on in our community, and it's a damn
25 shame it's happening and you're allowing it to happen.

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1 I know you said they passed all this stuff, they met
2 all requirements, but you don't live there; we do.
3 Thank you.

4 MS. OSTERMEIER: Mr. Sanfacon and followed by
5 Lalitha Doak.

6 MS. DOAK: No comment.

7 MR. SANFACON: My name a George Sanfacon,
8 spelled S-A-N-F-A-C-O-N. I live on Mud Lake in Norvell
9 Township just outside if Brooklyn. I'm hereby
10 petitioning EPA to deny permits for these two wells.
11 I'm doing this based on what we know. What do we know?
12 We know two things. We know the Irish Hills comprises
13 an extraordinary fresh water ecosystem, unsurpassed in
14 its beauty. It's important to the local economy and
15 its pivotal role in the bio region. It encompasses
16 scores of lakes as well as headwaters of several major
17 Michigan rivers.

18 Two, we know that the injection of massive
19 amounts of liquid waste into deep wells causes seismic
20 activities and earthquakes. While industry sources
21 claim otherwise, both the U.S. Army, and the U.S.
22 Geological Survey have concluded such.

23 Now based on the question and answer session
24 earlier, I know that your best guess is that it won't
25 be a problem, but I also know, as well as you do, that

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1 you cannot be 100% certain of that.

2 The possibility of seismic activity in the
3 proposed wells resulting in contamination of these
4 extraordinary fresh water resources cannot be ignored.
5 Surely this is not the place to apply any injection
6 technologies that are risk of contamination.

7 Based on the question and answer session
8 earlier, I also know that your criteria does not
9 include such factors. But this is a world class
10 heritage caliber site, and I believe that each of us
11 here, as well as the EPA, is duty-bound protected and
12 safeguarded on behalf of all people for all time.

13 Lastly, I assume that each of you took
14 employment with the EPA because you wanted to make a
15 real difference on the environment. You can do that by
16 denying these permits. Thank you.

17 MS. OSTERMEIER: Next is Dorothy Ann Coyne,
18 Dorothy Ann will be followed by Jennifer Porter.

19 MS. COYNE: My name is Dorothy Ann Coyne,
20 D-O-R-O-T-H-Y, A-N-N, C-O-Y-N-E. And I also am a
21 resident of a lake here in the Irish Hills. I have
22 been for 30 years. And I echo George's comment about
23 the beauty of the water land that we have here. We
24 have oil wells. It seems that is a fact of life, and
25 that is hard already for us, with the trucking, with

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1 the air pollution, with just the general phenomena of
2 so many oil wells in such a beautiful area. And it
3 would seem to me that the injection wells could be
4 taken on by other area. Now that would mean that the
5 brine would be trucked, and that is a fact of that kind
6 of thing if the injection wells got away from the oil
7 wells. But if a truck falls over and spills, we can
8 see what has happened, and we can get on the surface
9 and do the best we can to clean up. But if a steel
10 casing well is down hundreds of feet below us, and over
11 the decades begins to corrode or for some reason things
12 begin to migrate up through the layer of the shale or
13 whatever we have below us, we can't see it, we don't
14 know what's happening, and it seems to me in the best
15 tradition of ancient Americans, we must look out for
16 several generations to come.

17 My great hope is that these beautiful lakes,
18 58 lakes inside of seven miles, will still be the
19 beautiful place for long past or great grandchildren.
20 Fresh water on this planet is such a tremendous
21 treasure, and I thank the Environmental Protection
22 Agency for holding that protection for us. Thank you.

23 MS. OSTERMEIER: Jennifer Porter. Jennifer
24 will be followed by Mark Muhich.

25 MS. PORTER: My name is Jennifer Porter,

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1 P-O-R-T-E-R.

2 First thing I'd like to request is that when
3 announcements are made, they be made in the local
4 paper, not the Jackson Cit-Pat so that people who
5 actually live in the town are local paper we get it.
6 It's always like somebody is trying to hide things from
7 us.

8 The second comment I would like to make is
9 I'm sorry, I don't remember your name, but during when
10 you were saying your hands were tied, you made the
11 comment that you need to see it from our side. Well
12 forgive me for being so wrong, but dammit, you need to
13 see it from our side. We live here.

14 I can show you where my great-grandmother
15 lived. I can show you where my grandparents lived and
16 where my parents got married and lived on Vineyard Lake.
17 And now I live, and my kids live within a half a mile.
18 To tell you the truth, I'm not going to live there much
19 longer.

20 You said that there's no problem, there's no
21 possibility of it coming back up, but yet, you actually
22 made the comment when somebody asked about putting in a
23 well to test it that, you know, old wells, old wells
24 that haven't been closed off right there have been
25 possibilities and chances where they've gone and tested

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1 to see how far out the brine has gone. So it does come
2 back up. So it can go out, and one day our 42 wells
3 are going to turn into 80 wells, are going to be old
4 wells. It may not be in my lifetime or my kids', but
5 it could be in their kids'.

6 And liquid follows the path of least
7 resistance. It will eventually in some shape, way or
8 form, there's a very good possibility it will come back
9 up.

10 I'm proposing, because I really don't think
11 we have any say in this, I think this is a done deal,
12 but I'm proposing that you take water samples of
13 everybody within a couple mile radius of these
14 injection wells so that there is a baseline so that one
15 day when we start having health problems and we start
16 having problems, you can test it and say you know what,
17 your sample is different than it was on such and such a
18 date before.

19 I'm also proposing that there be tracers or
20 something like that put down so you know exactly that
21 it came from there, and West Bay can't say, well you
22 can't be sure, you can't be 100% sure, because they may
23 have followed what your requirements are, but they have
24 lied to people in the past and there is documentation
25 of that.

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1 The other thing that I'd like to see is air
2 quality samples be taken around these wells, and I
3 don't want it monitored just by West Bay. I'm sure we
4 would have enough volunteers in the community to rotate
5 on a regular basis so that we can monitor our own air
6 samples, and I don't think that's too much to ask.

7 MS. OSTERMEIER: Mark followed by Tamara
8 Russell.

9 MR. MUHICH: My name is Mark Muhich, M-A-R-K
10 M-U-H-I-C-H.

11 I'm the chair of the Central Michigan Group
12 of the Sierra Club which comprises seven counties from
13 Clinton County all the way down here in Jackson County,
14 Lenawee, County.

15 I think that the EPA should try to greater
16 detail the permit. As the previous speaker said, we
17 don't have a real baseline for water quality as it
18 exists today. We don't have a baseline for the air
19 quality. I think that we should do that before you
20 consider issuing this permit.

21 I don't think that you can appreciate how
22 valuable our well resources are. Just a couple of
23 hours before coming to this meeting we started filling
24 our pool from a well that's been in our family for 60
25 years, and it's a big two and a half inch hose, pumps

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1 out hundreds of thousands of gallons a minute. It's
2 cold, it's clear, it's clean, it's sweet. It must be
3 some of the best water in the world, and to think that
4 we're going to jeopardize it with a pro forma draft
5 permit I think would be a terrible tragedy.

6 I'd like for you to think about some of the
7 very rare species that live in this unique habitat, in
8 particular the turtles. Turtles have been as we know
9 existing on earth pretty much the same shape as they
10 have for over 200 million years, and yet, they are in
11 deep decline, especially some of the turtles that live
12 right around this vicinity. I'm talking about land
13 turtles and I'm talking about spotted turtles. Their
14 habitat is very clear water with very muddy bottoms,
15 and they need a lot of land to exist. They are in deep
16 decline because their habitat has been fragmented. And
17 before you issue this permit, I'd like you to consider
18 the increased fragmentation of their habitat when these
19 pipelines come for the 40 wells or the 80 wells that
20 are going to be pretty much dissecting critical habitat
21 for these turtles.

22 It's not an exaggeration to say that oil
23 companies have accomplished significant exceptions from
24 every other type of environmental rule and regulation.
25 Talking about you said you don't know what the

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1 Halliburton Rule is, but it's a matter of them thinking
2 that chemicals aren't proprietary and they don't have
3 to disclose them to us.

4 The oil industry, the gas industry have
5 excluded themselves from any type of local township or
6 county regulations. Depends on part 615. And what
7 other industry in the entire country can expect to work
8 that type of exemption?

9 We're talking about water, the greatest
10 resource in Michigan, and probably in the world. The
11 oil industry has exerted an influence which from
12 Michigan's water withdraw, so that means that
13 potentially they can draw out a million gallons, five
14 million gallons for each of these wells as the oil
15 plays out.

16 So what I'm asking you to do is set a
17 baseline for it, baseline environmental standard.
18 Think about cumulative impact for all of the wells that
19 two, three four injection wells. I know that this is a
20 standard that can be applied to the federal law. And
21 I'm looking at protecting one of the oldest and rarest
22 turtles that live in one of the greatest habitats in
23 the world so thank you very much.

24 MS. OSTERMEIER: Tamara Russell, followed by
25 Brent Bartson.

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1 MS. RUSSELL: I'm Tamara Russell,
2 T-A-M-A-R-A, R-U-S-S-E-L-L. Thank you.

3 And I am making a request to decline
4 injection wells, and I make that request for all wells
5 to be declined by you, please.

6 First of all, and the reason I'm asking you
7 to decline them is that you are the Environmental
8 Protection Agency. First you protect our environment.
9 I know you work within laws and regulations, but what
10 if, what if those laws are wrong? What if they don't
11 protect enough. So I ask you to protect us.

12 On the first basis on human error, you know,
13 there's human error everywhere with the wells, with the
14 well sites, with the life of the well, the construction
15 of the wells, as well as the traveling to and from the
16 wells. I mean these all need to be considered that
17 there is human error that can be involved with this.

18 The second that the earth changes in our
19 beautiful community has already expressed the things
20 that can happen there.

21 And last, but not lease, your responsibility
22 is to protect the environment, and as human beings, we
23 need to protect life. That is life that you're
24 risking. So please, decline the wells, all the wells.
25 Thank you.

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1 MS. OSTERMEIER: Brent Bartson will be
2 followed by John Bancroft.

3 MR. BARTSON: Brent Bartson, B-A-R-T-S-O-N.

4 I'm a resident of Lodi Township and the
5 Raisin River runs through our backyard. I'm here to
6 oppose these injections wells for many reasons. The
7 first reason is, you know, I came here expecting to
8 hear some professional comments and questions being
9 answered by the EPA. I thought the EPA was here to
10 answer those questions in a very scientific way. From
11 this community, I don't think this community feels you
12 did a very good job of answering those questions. In
13 fact, I think you offended a lot of people. So if EPA
14 is here to protect us from this type of industrial
15 activity, I don't feel very confident that you're doing
16 that very well.

17 I've also participated in a lot of the
18 meetings with the DEQ Office of Oil and Gas Management,
19 and I don't feel very confident that from their answers
20 that they're going to protect the environment from, you
21 know, possible mishaps that might occur from these
22 injections wells.

23 So my strong opinion is that you oppose these
24 permits, please. Thank you.

25 MS. OSTERMEIER: John Bancroft followed by

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1 Brook Fobes.

2 MR. BANCROFT: John Bancroft,
3 B-A-N-C-R-O-F-T.

4 I have a lot of things that I was going to
5 say but four minutes. I don't know if you've taken a
6 tour of the area to really look closely at it, get your
7 feet in the ground. The site that they have showing
8 the wells isn't very good. It's got little dots on
9 that. I've taken the time to use this piece of art and
10 you can't see it, I'll just put it in there. All those
11 little red dots are two years, and the black dots are
12 the injection wells where they proposed. The round
13 circles are the industrial sites that they call central
14 processing facilities. You look at that, if you get a
15 chance, okay? It's to scale. That's about a mile.

16 This area right here on that map running from
17 Wamplers Lake up to Wolf Lake Road is a unique nature
18 area, world unique. It's called a prairie fen, F-E-N,
19 and we have some of the most rare prairie fen on the
20 planet. It goes from maybe up by Pontiac, Michigan
21 right down through here, little south of here. All you
22 have to do is go out and see all that Adam described
23 and that's where it is. It's unique. It's sitting on
24 top of about 200 feet of glacial till, gravel. From
25 that source, and I disagree on it a little bit, because

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1 going off in that direction from this area is the
2 Tiffin River which connects to the Maumee River. The
3 St. Joseph River goes down to Elkhart, Indiana and then
4 out to Lake Michigan. Then you have the Kalamazoo
5 River running over to Saugatuck. You have the Grand
6 River going through Lansing and Grand Rapids. You have
7 actually Huron River on the north end of this area,
8 this being infested with oil wells as we speak.

9 Then we have this whole area covered by the
10 Raisin River. If you contact Sybil Kolon, she works
11 for DEQ, she has the information describing the
12 recharge of the whole watershed aquifer. And right
13 where these sites are that we're talking about, and the
14 wells, the pixels are dark red. It's the heaviest
15 recharge for all these rivers. We are the top of the
16 hill, and this is a huge recharge.

17 Virtually everybody that lives, and there's
18 72 towns and cities on these rivers, everybody except
19 maybe over by Detroit, depends on well water,
20 everybody. Very few get much surface water, it's all
21 wells. Personal people, cities, it's all clean, sweet,
22 pure well water, okay? To allow injection wells, and
23 there are already some in the edges of this, to come in
24 here is jeopardizing the future. I'm almost done.

25 Every single penny of economy is taking place

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1 in this area for the last 200 years has relied on that
2 water. We're going to have a few years where they're
3 going to take a few billion dollars worth of oil and
4 gas out here. Then we have to go for the rest of
5 eternity depending on this water, the biggest sources
6 of freshwater in the world. Everybody else in the
7 world is in trouble with water. Michigan has it, and
8 these people, and I've got a real bone to pick with the
9 DEQ, the Department of Environmental Quality, to allow
10 this kind of infestation filth to come in here on this
11 kind of land should be illegal, and we will pursue this
12 with you, and the oil companies. We will not get off
13 you ever. We're going to increase it, and we're going
14 to put pressure on you because you've got to do your
15 job and you'd better start doing it. Thank you.

16 MS. OSTERMEIER: Brooke Fobes, followed by
17 Anita Fobes.

18 MS. FOBES: Okay. My name is Brooke Fobes,
19 Last name is F-O-B-E-S, and I'm a registered nurse here
20 practicing in Michigan. I've also had experience in
21 research and environmental health, and I have
22 significant concerns about this well that's being
23 proposed. I don't know what the stage is that it's in
24 right now, but I really ask that you not approve this
25 well. I don't live in the area, but several of my very

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1 dearest friends do live in this area, very near to this
2 proposed well, and I have significant concerns about
3 their land and my friends that farm in the area. I
4 worry about that too.

5 I guess this is our point where we say what
6 we would like our response from the EPA that we say it
7 and respond in writing. So I have a couple questions
8 just for the record. I would like to know what is
9 brine exactly? I think it's a very misleading term
10 because in common use, this means saltwater, but I
11 think you might mean it more of a chemical sense. I
12 think that's something we all really need to know
13 what's in there.

14 Why are there not environmental impact
15 studies required? They should be required for any and
16 all wells of any type, including injection wells.
17 There should be an environmental impact study for this
18 well and all wells.

19 I would like to know also who's responsible
20 for notifying the community. That's been a problem as
21 people in this community were not notified in the
22 publication available to them here locally. So we
23 actually were able to network and talk to each other
24 and find out, fortunately, to be here tonight,
25 otherwise we would have never known. That's a very

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1 important part to involve the community where you're
2 approving a well from.

3 I also note from my environmental health
4 studies I did when I was a student nurse that there is
5 not, at least there wasn't at this time, any required
6 for testing rural well water for safety. Certainly not
7 any general standards for testing rural wells on any
8 regular basis, and I don't think it's even a funded
9 activity. So I think that that's something that needs
10 to be done around any proposed well that goes in.

11 I'd also like to know if the EPA can't stop a
12 well like this when the community doesn't want it, then
13 who can? I would like to see the response in writing.
14 I think that's all I have.

15 I just would like to add that water is the
16 most important resource we have and we are very proud
17 of it here. We know in Michigan this is something
18 that's very special about where we live, and we care
19 about it, and we're stubborn, and I'm sure we'll be
20 watching this issue in the future. Water is priceless,
21 and it's necessary for life, so really this is a right
22 that we have safe water and there's really no way to
23 put the Genie back in the bottle once we have these
24 chemicals down in the ground. Despite all precautions,
25 the water will -- the flows underground will change

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1 over time, and there's no way to anticipate where these
2 chemicals will go years down the road. So thank you
3 very much for being here, and I please ask that you
4 decline this well permit.

5 MS. OSTERMEIER: Anita Fobes, followed by
6 Kurt Gleichman.

7 MS. FOBES: My name is Anita Fobes, A-N-I-T-A
8 F-O-B-E-S. I understand that your job as EPA official
9 is to grant permits based on technical, scientific and
10 legal requirements. And the sentiment of those of us
11 here are the values of this community don't really play
12 into a decision that you're making. However, the
13 permit that we're discussing tonight describes
14 injection of brine, as you said, 2950 feet below ground
15 level. I'm more concerned about the surface
16 contamination and consequences of -- environmental
17 consequences of this injection well.

18 A significant number of contamination events
19 result from human error, not in engineering or
20 technical mistakes. For this reason, because the area
21 is so sensitive environmentally, I would request that
22 you deny or deny the permit and conduct a complete
23 environmental study of the impacts of a surface event.

24 At the Super 8 meeting that we all call the
25 Super 8 meeting that happened earlier this year, one of

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1 the West Bay officials said that pipelines will be
2 constructed to deliver brine waste to the injection
3 wells, and with, with pipeline situation we haven't
4 discussed this at all, I don't know if it's actually
5 part of the EPA permit, but there's an inevitability
6 that the pipelines will eventually fail, they just do.
7 And a failure of a pipeline over wetlands and this
8 environmentally sensitive area would be a catastrophe,
9 not just an event, but it would be a catastrophe to a
10 larger area and Great Lakes.

11 So I believe that the terms of this permit
12 are not consistent with EPA guidelines for the
13 injection program and I believe an extensive
14 environmental study needs to be completed before the
15 permit goes any further. Thank you.

16 MS. OSTERMEIER: And then did Jack Curtis
17 return? Did Jack Curtis return. Okay. Then Kurt
18 Gleichman followed by Kathryn Ulbin.

19 MR. GLEICHMAN: Kurt Gleichman. K-U-R-T,
20 G-L-E-I-C-H-M-A-N.

21 How does the industry, EPA, DEQ protect
22 citizens from the cost of water testing? How frequent
23 should they test. How do citizens know when their
24 water is contaminated by the injection well? Who has
25 the burden of proof? Who will pay for the cost of

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1 cleanup, medical treatment, provision of fresh water to
2 the citizens? Who is ensuring the protection of the
3 citizens well water after the injection well is capped?

4 These injection wells violate our
5 constitutional right and should not be built. Michigan
6 Constitution Article 1, Section 1 says, "All political
7 power is inherent in the people. Government is
8 instituted for their equal benefits, security, and
9 protection." It does not say all political power is
10 inherent in the industry. Government is instituted for
11 their equal benefits, security, and protection.

12 Who is requesting these wells? Industry.
13 Who does not want these wells? The people. Injecting
14 toxic waste under our aquifers only benefits industry
15 and leaves our communities with an insecure existence
16 and unprotected future. Thank you.

17 MS. ULBIN: Kathryn Ulbin. U-L-B-I-N. I
18 live in Norvell Township at Vineyard Lake. I have a
19 few things to say. One, we, live in the River Raisin
20 watershed basin. If that doesn't tell you where we
21 live, there's nothing else. If you don't know that,
22 you should be looking at our township.

23 The pristine part of the River Raisin is
24 where you've got an injection well. It's 1000 feet
25 from the River Raisin. That is the pristine part of

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1 the River Raisin.

2 I wonder what happened to transparency. Why
3 wasn't the township notified? Why weren't the people
4 of Norvell Township notified? I think that is
5 terrible. Are you doing away with local government?
6 There was a spill in 1987 at Gilbert Science, and that
7 was in Ann Arbor. It was approved by the DNR, and it
8 was an injection well, and it didn't work. It's
9 contaminated still today, and they can't even sell the
10 building around the contamination. So it never goes
11 away once it's contaminated.

12 I wish that you would move these injection
13 wells away from the pristine parts of our township.
14 The West Bay said they did an environmental impact
15 study. Where is it? Does anyone know where it is? We
16 don't. We've never seen it. We would like to see it.

17 Most of the errors are -- 80% of the errors
18 with the injection wells are from human errors, and the
19 others are construction malfunctions. The people who
20 pay for these environmental contaminations are private,
21 and also the people in the community pay. Thank you.

22 MS. OSTERMEIER: I believe we've -- I've
23 called everyone who indicated on these papers that were
24 interested. Did I miss you? Okay. Please, if you'd
25 like to make public comment. I apologize if I missed

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1 somebody, it wasn't intentional.

2 MR. COYNE: My name is Bernie Coyne,
3 C-O-Y-N-E, and I've lived here for 30 years. And we
4 live in one of the epicenters of fresh water in the
5 world. And we look at the news, you see all these
6 people that are dying for fresh water, and for us to
7 contaminate this makes no sense at all.

8 And the decision making process, I'm sure
9 you've followed every regulation, but it was, my wife
10 referred to it earlier, the native American people
11 think about seven generations into the future when they
12 make a big decision. I think this decision has been
13 made basically following the regulations, but informed
14 by the oil company and not by research.

15 And I can understand innocently in Chicago,
16 you think that's valid. However, the truth is, and you
17 heard it from all these wonderful, clear descriptions
18 of feeling and scientific fact that it's inadequate
19 what we have received in information, and we wonder if
20 you're getting the right information because the source
21 is the oil company. I mean it's like saying now Mr.
22 Fox, would you watch the chicken coop.

23 And an environmental study would indicate how
24 very special this water wonderland is. And also then
25 there is the fen, and then there are all the special

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1 species. And on the basis of a thorough engagement
2 with Environmental Protection Acts, we ought to be able
3 to say no very definitely, not because we live here,
4 because we love the water and it's so rare. Please
5 take that under consideration. Thank you.

6 MS. OSTERMEIER: Okay. I'm going to take
7 this gentleman who just stood up, then Sharon Donovan,
8 and followed by Sharon will be you.

9 MR. GAJAR: Good evening. My name is John
10 G-A-J-A-R, and I submitted a written statement as to
11 why I think there should not be an injection well and
12 it goes over everything we've already said here about
13 the seismic activity, which I believe the gentleman
14 said we have a very soft basin, not an impervious basin
15 as was suggested. But I think, I think the EPA is
16 trying to do their job, but a great man in my time once
17 said, the buck stops here.

18 Ladies and gentlemen of the EPA, you have an
19 opportunity to preserve what we have here. I ask you
20 to ask your conscious, because if I was sitting up
21 there, I'd ask myself, what would I do, and I would do
22 what my conscious tells me is the right thing to do,
23 and that is listen to the people, we the people. Thank
24 you.

25 MS. DONOVAN: Sharon Donovan, D-O-N-O-V-A-N.

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1 The stuff I've heard from other people is really
2 compelling and emotional basis, but what I was
3 wondering is what is the EPA required to do, whether
4 you actually have the ability to stop this from
5 happening, from the injection wells being in such a
6 beautiful place and what power does this community
7 have, and what processes can we follow to have actual
8 choices over the powers to make this not happen.

9 I'm also curious that these rivers in this
10 area drain into the Great Lakes, that means they also
11 impact Canadian water rights. And I also wanted to
12 know about the -- in the structure of the EPA it seems
13 to me that some of its effectiveness is hampered by
14 politics and funding, and the political cycle. We're
15 in a place where nothing gets done right now, maybe
16 nothing will get done for the rest of the year.

17 But the other thing that budget affects its
18 enforcement and oversight, and what I don't know
19 anything about is whether you guys actually have the
20 ability to staff, the funding or any of the kinds of
21 things the enable the EPA to protect these communities,
22 and I feel very sorry for you having to sit there being
23 targets. Thank you.

24 MS. GLEICHMAN: Hello, my name is Hillary
25 Gleichman, G-L-E-I-C-H-M-A-N, and I'm from Washtenaw

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1 County. Although I'm not from this county, I am part
2 of the community. I am your neighbor. I am your
3 friend. I care what happens here. I don't know that
4 I'm a friend and neighbor of the EPA or DEQ. I don't
5 understand -- I'll back up.

6 Some of you have delivered passionate
7 speeches; some of you have delivered factual
8 statements. As I step back, I can't even believe that
9 we're talking about allowing our government people from
10 other areas to come in and rape this land, take our
11 water, spoil the aquifers, spoil our water and then
12 leave, and leave us with the mess to be cleaned up not
13 by ourselves but by future generations from here to
14 eternity, as John said. That we're even discussing
15 this just disgusts me beyond belief, and I, of course,
16 hope this is turned down. I understand that you have a
17 job to do, but this is, this is a life's water, our
18 life, not just in Michigan but as human beings. Why
19 are we going to such extreme measures to try to extract
20 a finite resource? We can be putting energy literally
21 and figuratively into renewable energies as opposed to
22 going to such extreme measures, and then leaving the
23 waste. And I do feel like it's just a rape of the
24 earth. Thank you.

25 MS. OSTERMEIER: Yes, please come on up.

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1 MR. WOTTON: Good evening. My name is Clive
2 Wotton, W-O-T-T-O-N, resident of Saline and a frequent
3 camper an enjoyer of this area, and I'm shocked at
4 what's happened around here with the number of oil
5 wells that's gone in. To my mind it's actually it's
6 very damaging to the area. It obviously relies on
7 tourism quite heavily.

8 So yesterday my wife gave me some papers to
9 read and they're actually coal papers involving West
10 Bay from 1998, where West Bay intentionally perforated
11 tanks to allow drainage to occur in the ground causing
12 contamination which DEQ were involved in actually
13 forcing remediation. I'm shocked that you're allowing
14 West Bay to do a survey, to then actually do the
15 monitoring and actually put in a site wells or testing
16 wells, a company that has intentionally polluted
17 previously. Thank you.

18 MS. OSTERMEIER: Is there anybody else who
19 was not given an opportunity to make a public comment
20 for the record that would still like to do that. Also
21 remember, if you're interested in submitting something
22 in writing, you can do that as well. With that, Dana?

23 MS. RZEZNIK: I just have to ask those
24 questions officially for the record. Is there anyone
25 who has requested to speak but whose name was not

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1 called? Is there anyone who would like to enter
2 comments into the formal record?

3 Let the record show that no one indicates
4 they wish to enter comments. Thank you.

5 Again, if you have written comments, but did
6 not wish to speak, please give them to one of us before
7 you leave here tonight, or forward them in writing to
8 the EPA prior to the deadline of June 1st, 2012.

9 This concludes the hearing. Thank you.
10 (The proceeding was concluded at 8:42 p.m.)

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C E R T I F I C A T E

STATE OF MICHIGAN:

I, Mindy Womack, a Michigan Certified Court Reporter,
do hereby certify:

That the foregoing proceedings were taken
down, as stated in the caption, and reduced to
typewriting under my direction, and that
the foregoing pages represent a true
record of said proceedings.

IN WITNESS WHEREOF, I have hereunto set my
hand this 1st day of June, 2011.

Jane Rose Reporting

Mindy Womack



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